



Longitudinal Associations of Physical Touch with Loneliness among Older Adults



Taylor V. Brown, B.A., Reese C. Giddens, Stephanie J. Wilson Ph.D
Department of Psychology, Southern Methodist University

Introduction

BACKGROUND

- Older adults in the US face heightened risks for social disconnection, and the COVID-19 pandemic has further exacerbated this crisis.
- Physical touch is a key dimension of social connection that uniquely predicts physical and mental health benefits [1].
- Lack of social contact and a deficit of sensory stimulation was correlated with loneliness in older adults [2].
- Companion animals have been shown to promote mental and physical health benefits [3].
- Studies have found that individuals who have less physical and social interactions experience more loneliness [4].
- Older adults who have frequent in-person contact with loved ones report lower loneliness scores [5].

GAPS IN THE LITERATURE

- Prior work suggests that there is supporting evidence that factors such as social contact and in-person contact mitigate loneliness, there is little evidence about how physical touch affects loneliness longitudinally in older adults. Most studies in this area have been limited by cross-sectional design. No prior work has examined the long-term implications of physical touch on loneliness in older adults.

Hypotheses

H1: It was hypothesized that more frequent physical contact with friends and family would predict lower levels of loneliness over a five year period while also controlling for age, race, health conditions, frequency of social interactions and baseline levels of loneliness.

H2: It was hypothesized that more frequent touch with pets would predict lower levels of loneliness.

Methods

PARTICIPANTS

- This study utilized data from 1627 older adults (N =68, range = 57-85) who participated in Waves 1 and 2 of the National Social Life, Health, and Aging Project (NSHAP)[6]. The majority of participants were identified as white (81.69%). Wave 1 and Wave 2 data were collected 5 years apart.

MEASURES AND PROCEDURES

- To assess loneliness participants completed a abbreviated version of the UCLA loneliness scale [7] in both waves. Human touch was measured by assessing the frequency of physical interactions with romantic partners and other adults within the past 12 months. Pet touch was measured by assessing the frequency of petting/touching a cat, dog or other pet within the past 12 months.
- To test these hypotheses, a multiple regression was conducted to assess the relationship between touch and loneliness between the two waves.

TABLE 1

Note: * indicates p values is less than .05

	M	SD	1	2	3	4	5	6	7	8
Age	68.13	7.38								
Comorbidities (W1)	3.17	1.72	0.21386 <.0001*							
Frequency of Social Contact (W1)	4.42	1.19	0.01664 0.5049	0.00804 0.7473						
Loneliness (W1)	3.94	1.34	-0.05737 0.0207*	0.09713 <.0001*	-0.11483 <.0001*					
Loneliness at (W2)	3.13	2.25	0.02035 0.4120	0.10959 <.0001*	-0.08585 0.006*	0.47677 <.0001*				
Human Touch (W2)	5.18	1.28	-0.05858 0.0181*	0.01596 0.5200	0.21271 <.0001*	-0.06675 0.0071*	-0.12588 <.0001*			
Human Touch (W2)	2.58	1.56	-0.09224 0.0002*	0.00374 0.8801	0.13745 <.0001*	-0.01625 0.5124	-0.06416 0.0096*	0.25240 <.0001*		
Pet Touch (W1)	4.18	2.21	0.09816 <.0001*	-0.03309 0.1831	0.07474 0.0028*	-0.05446 0.0284*	-0.00783 0.7529	0.14424 <.0001*	0.02136 0.3902	
Pet Touch (W2)	2.29	2.46	-0.13637 <.0001*	-0.01844 0.4603	0.05387 0.0319*	-0.01363 0.5853	0.01650 0.5088	0.08022 0.0013*	0.07597 0.0023*	0.50824 <.0001*

Results

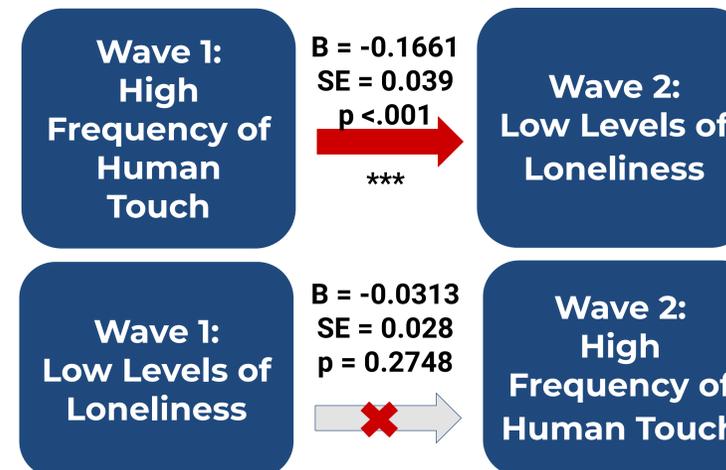
FINDING 1:

- Results revealed that more frequent physical contact with family and friends predicted larger decreases in loneliness over the subsequent five years (p<.0001).
- To further assess directionality, models tested whether lonelier people experienced decreased touch over time, and the effects were null (p>.250).

FINDING 2:

- Frequent physical contact with pets had no unique effect at baseline (p=.136).

FIGURE 1



Covariates: Age, Comorbidities, Frequency of Social Interaction, Human Touch, Pet Touch
Note: *** indicates a significant relationship

Conclusions

- Increased human physical touch was found to significantly predict lower loneliness scores over the five years. Building on prior cross-sectional work, our study finds that frequency of touch would have a relationship with loneliness.
- A significant association between frequency of touch with a pet and loneliness scores was not found longitudinally or within waves. The very small number of pet owners may have resulted in insufficient power to detect an effect.
- This longitudinal study is the first to identify the unique contribution of human physical touch to prospective changes in loneliness, beyond the well-established effects of covariates, including social interaction frequency.
- Future Directions**
- Future studies should isolate the different kinds of physical touch such as hugging and kissing into separate variables to determine if the type of touch has a different effect.
- Little is known about the potential long-term impacts COVID-19 lockdowns have had on older populations. Based off of this study it is likely the inability to share touch with loved ones over this period of time could have long term negative consequences for older adults.

References

[1]Thomas, P. A., & Kim, S. (2021). Lost touch? Implications of physical touch for physical health. *The Journals of Gerontology: Series B*, 76(3), e111-e115.

[2]Monk. (1988). Aging, loneliness, and communications. *The American Behavioral Scientist*, 31(5), 532-563. <https://doi.org/10.1177/000276488031005004>

[3]Barchas, D., Melaragni, M., Abraham, H., & Barchas, E. (2020). The Best Medicine: Personal Pets and Therapy Animals in the Hospital Setting. *Critical care nursing clinics of North America*, 32(2), 167-190. <https://doi.org/10.1016/j.cnc.2020.01.002>

[4]Heatley Tejada, A., Dunbar, R., & Montero, M. (2020). Physical Contact and Loneliness: Being Touched Reduces Perceptions of Loneliness. *Adaptive human behavior and physiology*, 1-15. Advance online publication. <https://doi.org/10.1007/s40750-020-00138-0>

[5]Morgan, D. L. (1988). Age differences in social network participation. *Journal of Gerontology*, 43(4), S129-S137.

[6]Russell, D., Peplau, L. A., & Ferguson, M. L. (1978). Developing a measure of loneliness. *Journal of Personality Assessment*, 42, 290-294

[7]Waite, Linda J., Cagney, Kathleen A., Dale, William, Huang, Elbert, Laumann, Edward O., McClintock, Martha K., ... Cornwell, Benjamin. National Social Life, Health, and Aging Project (NSHAP): Round 2 and Partner Data Collection, [United States], 2010-2011. Inter-university Consortium for Political and Social Research [distributor], 2019-06-19. <https://doi.org/10.3886/ICPSR34921.v4>

Acknowledgements

This work has been supported by the National Institute on Aging (R00 AG056667).